FOXCONN®

H81MXV Series

Motherboard

User's Manual

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Trademark:

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Version:

User's Manual V1.1 for H81MXV Series motherboard.

Symbol description:

Note:
Refers to important information that can help you to use motherboard better, and tells you how to avoid problems.

Caution:
Indicating a potential risk of hardware damage or physical injury may exist.

WEEE:
The use of this symbol indicates that this product may not be treated as household waste. By ensuring this product is disposed of correctly, you will help prevent potential negative consequences for the environment and human health, which could otherwise be caused by inappropriate waste handling of this product. For more detailed information about recycling of this product, please contact your local city office, your household waste disposal service or the shop where you purchased this product.

More information:

If you want more information about our products, please visit:
http://www.foxconnchannel.com

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All images are for reference only, please refer to the physical motherboard for specific features.

Declaration of conformity

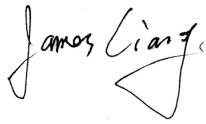
CE

HON HAI PRECISION INDUSTRY COMPANY LTD
66 , CHUNG SHAN RD., TU-CHENG INDUSTRIAL DISTRICT,
TAIPEI HSIEN, TAIWAN, R.O.C.

declares that the product
Motherboard H81MXV Series

is in conformity with
(reference to the specification under which conformity is declared in accordance with 89/336 EEC-EMC Directive)

- EN 55022: 1998/A2: 2003 Limits and methods of measurements of radio disturbance characteristics of information technology equipment
- EN 61000-3-2/:2000 Electromagnetic compatibility (EMC)
  Part 3: Limits
  Section 2: Limits for harmonic current emissions (equipment input current <= 16A per phase)
- EN 61000-3-3/A1:2001 Electromagnetic compatibility (EMC)
  Part 3: Limits
  Section 2: Limits of voltage fluctuations and flicker in low voltage supply systems for equipment with rated current <= 16A
- EN 55024/A2:2003 Information technology equipment-Immunity characteristics limits and methods of measurement

Signature : 

Place / Date : TAIPEI/2013

Printed Name : James Liang

Declaration of conformity

Trade Name:	FOXCONN
Model Name:	H81MXV Series
Responsible Party:	PCE Industry Inc.
Address:	458 E. Lambert Rd. Fullerton, CA 92835
Telephone:	714-738-8868
Facsimile:	714-738-8838
Equipment Classification:	FCC Class B Subassembly
Type of Product:	Motherboard
Manufacturer:	HON HAI PRECISION INDUSTRY COMPANY LTD
Address:	66 , CHUNG SHAN RD., TU-CHENG INDUSTRIAL DISTRICT, TAIPEI HSIEN, TAIWAN, R.O.C.

Supplementary Information:

This device complies with Part 15 of the FCC Rules. Operation is subject to the following two conditions : (1) this device may not cause harmful interference, and (2) this device must accept any interference received, including interference that may cause undesired operation.
Tested to comply with FCC standards.

Signature : Date : 2013

Installation Precautions

- Electrostatic discharge (ESD) is the sudden and momentary electric current that flows between two objects at different electrical potentials. Normally it comes out as a spark which will quickly damage your electronic equipment. Please wear an electrostatic discharge (ESD) wrist strap when handling components such as a motherboard, CPU or memory.
- Ensure that the DC power supply is turned off before installing or removing CPU, memory, expansion cards or other peripherals. It is recommended to unplug the AC power cord from the power supply outlet. Failure to unplug the power supply cord may result in serious damage to your system.

Please carefully read the following procedures to install your computer :

- It is suggested to select high-quality, certified fans in order to avoid damage to the motherboard and CPU due to high temperature. Never turn on the computer if the CPU fan is not properly installed.
- We cannot guarantee that your system can operate normally when your CPU is overclocked. Normal operation depends on the overclocking capacity of your device.
- If there is any, when connecting USB, audio, 1394a, RS232 COM, IrDA or S/PDIF cables to the internal connectors on the motherboard, make sure their pinouts are matching with the connectors on the motherboard. Incorrect connections might damage the motherboard.
- When handling the motherboard, avoid touching any metal leads or connectors.
- If there is a PCI Express x16 graphics card installed in your system, we recommend using a 24-pin ATX power supply to get the best performance.
- Before turning on the power, please make sure the power supply AC input voltage setting has been configured to the local standard.
- To prevent damage to the motherboard, do not allow screws to come in contact with the motherboard circuit or its components. Also, make sure there are no leftover screws or metal components placed on the motherboard or within the computer casing.
- If you are uncertain about any installation steps or have a problem related to the use of the product, please consult a certified computer technician.

Technical Support

Website: http://www.foxconnchannel.com
Support Website: http://www.foxconnsupport.com
Worldwide online contact Support: http://www.foxconnsupport.com/inquiry.aspx
CPU Support List: http://www.foxconnsupport.com/cpusupportlist.aspx
Memory, VGA Compatibility List: http://www.foxconnsupport.com/complist.aspx

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Chapter 1 Product Introduction

Thank you for buying Foxconn H81MXV Series motherboard. Foxconn products are engineered to maximize computing power, providing only what you need for break-through performance.

This chapter includes the following information:

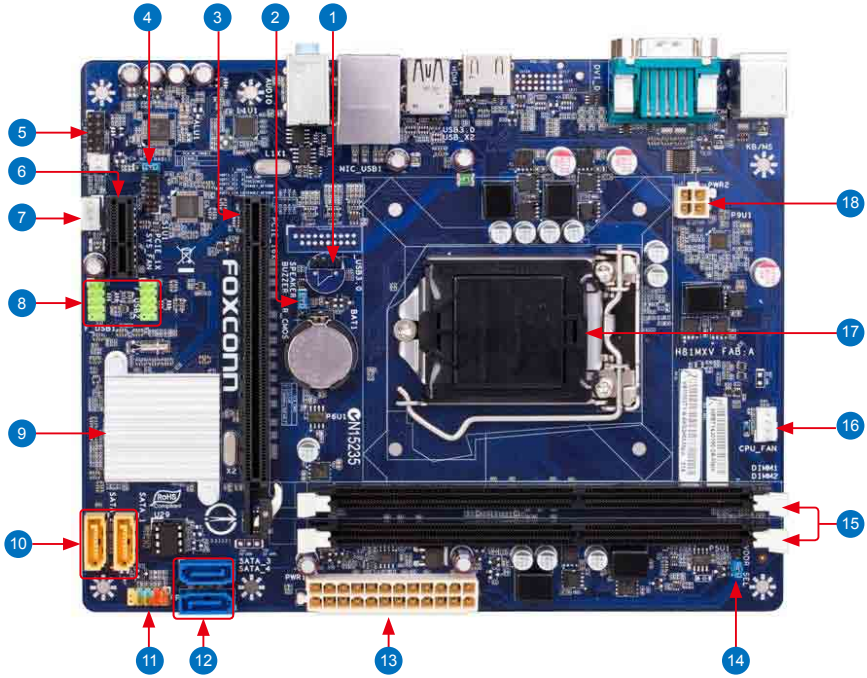
- Product Specifications
- Layout
- Back Panel Connectors

1-1 Product Specifications

CPU	Support Intel® 4th Generation Core processors Max processor power up to 84W For the latest CPU information, please visit: http://www.foxconnsupport.com/cpusupportlist.aspx
Chipset	Intel® H81
Memory	2 x 240-pin DDR3/DDR3L SDRAM DIMMs Support up to 16GB of system memory Dual channel DDR3 1600/1333 MHz architecture
Expansion Slots	1 x PCI Express X16 slot -Support PCI Express Gen2 5GT/s data rate 1 x PCI Express X1 slot -Support PCI Express Gen2 5GT/s data rate
Storage	Intel® H81 chipset - 2 x SATA 2.0 connectors (3Gb/s data transfer rate) - 2 x SATA 3.0 connectors (6Gb/s data transfer rate)
LAN	Realtek RTL8111F Giga LAN chip Support 10/100/1000Mbps
Audio	Realtek ALC662 audio chip -High Definition Audio -2/4/5.1-channel -Support Jack-Sensing function
USB	Support up to 6 x USB 2.0 ports (2 rear panel ports, 2 onboard USB headers supporting 4 extra ports) Support USB 2.0 protocol up to 480Mb/s Support up to 2 x USB 3.0 ports (2 rear panel ports) Support USB 3.0 protocol up to 5Gb/s
Internal Connectors	1 x 24-Pin ATX power connector 1 x 4-pin ATX 12V power connector 2 x SATA 3.0 connectors 2 x SATA 2.0 connectors 2 x USB 2.0 headers 1 x CPU FAN header (4-pin) 1 x System FAN header (4-pin) 1 x Front panel header 1 x Front audio header 1 x Speaker header 1 x Clear CMOS header 1 x ME header 1 x VDDR_SEL header
Back Panel Connectors	1 x PS/2 Keyboard port 1 x PS/2 Mouse port 1 x VGA port 1 x COM port 2 x USB 2.0 ports 2 x USB 3.0 ports 1 x DVI-D port(H81MXV-D) 1 x HDMI port(H81MXV)

Back Panel Connectors	1 x RJ45 LAN port 3 x Audio ports
Hardware Monitor	System voltage detection CPU/System temperature detection CPU/System fan speed detection CPU Overheating warning CPU/System fan speed control
Green Function	Support ACPI (Advanced Configuration and Power Interface) Support S0 (normal), S1 (power on suspend), S3 (suspend to RAM), S4 (suspend to disk), S5 (soft - off) Support EuP function
Bundled Software	FOX ONE FOX LiveUpdate FOX LOGO FOX DMI
Operating System	Support for Microsoft® Windows® 8.1/7
Form Factor	Micro ATX Form Factor, 8.5 inches x 6.8 inches (21.6cm x 17.3cm)

1-2 Layout

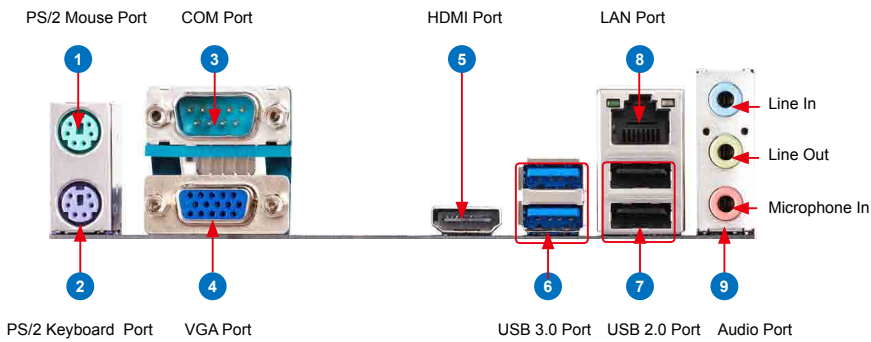


1. Speaker Header
2. Clear CMOS Header
3. PCI Express X16 Slot
4. ME Header
5. Front Audio Header
6. PCI Express X1 Slot
7. SYS_FAN Header
8. Front USB 2.0 Headers
9. Chipset: Intel® H81
10. SATA 3.0 Connectors
11. Front Panel Header
12. SATA 2.0 Connectors
13. 24-pin ATX Power Connector
14. VDDR_SEL Header
15. DDR3 DIMM Slots
16. CPU_FAN Header
17. LGA1150 CPU Socket
18. 4-pin ATX 12V Power Connector

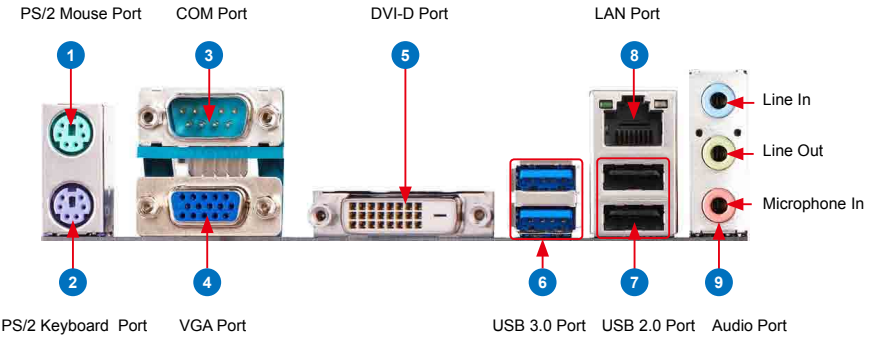
NOTE The above motherboard layout is for reference only, please refer to the physical motherboard for detail.

1-3 Back Panel Connectors

H81MXV:



H81MXV-D:



1. PS/2 Mouse Port

Use the port(green) to connect a PS/2 mouse.

2. PS/2 Keyboard Port

Use the port(purple) to connect a PS/2 keyboard.

3. COM Port

This is output of RS232 COM port.

4. VGA Port

Use this port to connect external display devices, such as monitor or LCD display.

5. HDMI Port (H81MXV)

The HDMI (High-Definition Multimedia Interface) provides an all-digital audio/video interface to transmit the uncompressed audio/video signals and is HDCP compliant. Connect the HDMI audio/video device to this port. The HDMI Technology can support a maximum resolution of 1920x1080p but the actual resolutions supported depend on the monitor being used.

DVI-D Port (H81MXV-D)

The DVI-D port supports DVI-D specification. Connect a monitor that supports DVI-D connec tion to this port.

6. USB 3.0 Ports

The USB port supports the USB 3.0/2.0/1.1 specification. Use this port for USB devices such

as an USB keyboard/mouse, USB printer, USB flash drive and etc. You need to install the USB 3.0 driver in the Driver CD before using it.

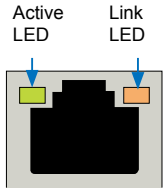
7. USB 2.0 Ports

The USB port supports the USB 2.0/1.1 specification. Use this port for USB devices such as an USB keyboard/mouse, USB printer, USB flash drive and etc.

8. LAN Port

The Ethernet LAN port provides Internet connection at up to 10/100/1000Mb/s data rate.

LAN Type	Left: Active		Right: Link	
	Status	Description	Status	Description
1000M	Off	No Link	Off	No Link
	Green Blinking	Data Activity	Off	10Mb/s Connection
			Green	100Mb/s Connection
			Orange	1000Mb/s Connection



9. Audio Ports

For the definition of each audio port, please refer to the table below:

Port	2-channel	4-channel	5.1-channel
Blue	Line In	Rear Speaker Out*	Rear Speaker Out*
Green	Line Out	Front Speaker Out	Front Speaker Out
Pink	Microphone In	Microphone In	Center/Subwoofer Out*

*: Please refer to Chapter 4, and run the Realtek audio driver (in CD) to assign the audio output ports for different applications of 2/4/5.1 channels. The fundamental audio outputs are depicted in the table above.

Chapter 2 Hardware Installation

This chapter introduces the hardware installation process, including the installation of the CPU, memory, power supply, slots, pin headers and the mounting of jumpers. Caution should be exercised during the installation of these modules. Please refer to the motherboard layout prior to any installation and read the contents in this chapter carefully.

This chapter includes the following information :

- Install the CPU and CPU Cooler
- Install the Memory
- Install an Expansion Card
- Install other Internal Connectors
- Jumpers

2-1 Install the CPU and CPU Cooler

Read the following guidelines before you begin to install the CPU :

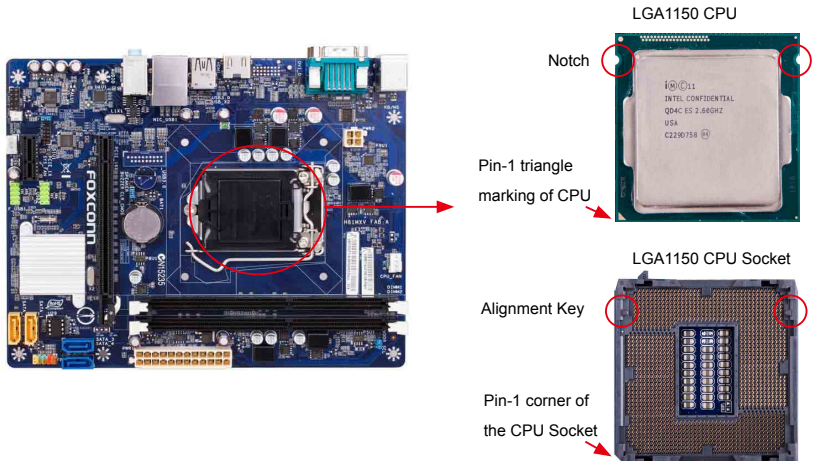
- Make sure that the motherboard supports the CPU.
- Always turn off the computer and unplug the power cord from the power supply before installing the CPU to prevent hardware damage.
- Locate the pin one of the CPU. The CPU cannot be inserted if oriented incorrectly. (Or you may locate the notches on both sides of the CPU and alignment keys on the CPU socket.)
- Apply an even and thin layer of thermal grease on the surface of the CPU.
- Do not turn on the computer if the CPU cooler is not installed, otherwise overheating and damage of the CPU may occur.
- Set the CPU host frequency in accordance with the CPU specifications. It is not recommended that the system bus frequency be set beyond hardware specifications since it does not meet the standard requirements for the peripherals. If you wish to set the frequency beyond the standard specifications, please do so according to your hardware specifications including the CPU, graphics card, memory, hard drive, etc.

Hyper-Threading Technology System Requirements:
(Go to Intel's website for more information about the Hyper-Threading Technology)

- An Intel® CPU that supports HT Technology
- A chipset that supports HT Technology
- An operating system that is optimized for HT Technology
- A BIOS that supports HT Technology and has it enabled

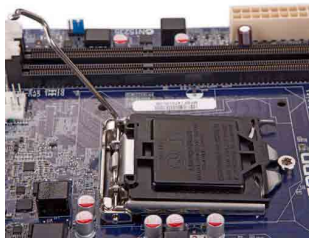
Install the CPU

Locate the alignment keys on the motherboard CPU socket and the notches on the CPU.

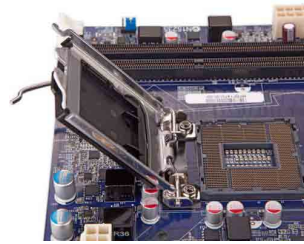


Follow the steps to install the CPU onto the CPU socket :

NOTE Before installing the CPU, make sure to turn off the computer and unplug the power cord from the power outlet to prevent damage to the CPU.



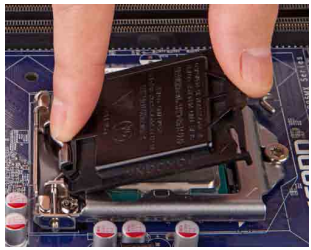
1. Release the CPU socket lever.



2. Lift the metal cover on the CPU socket.

3. Check pin one marking (triangle) with the pin one corner of the CPU socket, align the CPU notches with the socket alignment keys and gently put the CPU onto the socket.

4. When CPU is properly seated, replace the metal cover and push the CPU socket lever back to its locked position.

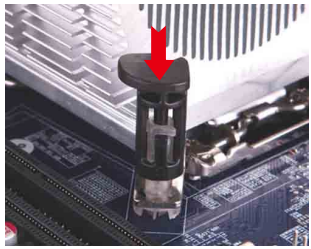


5. Remove protective socket cover.

Install the CPU Cooler

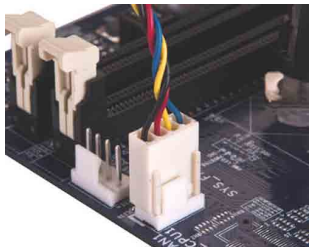
Follow the steps below to correctly install the CPU cooler on the motherboard.

1. Apply and spread an even thermal grease on the surface of CPU.

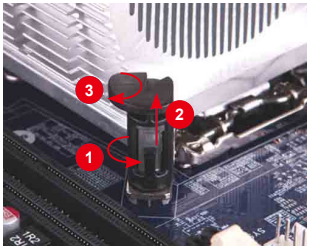


2. Place the four bolts of the CPU cooler to the holes of the motherboard, push them straight down from the top, and the bolts will be fastened on the motherboard. That's it.

3. Check the solder side of the motherboard, the push pin should be fixed as depicted in the picture.



4. Attach the 4-wire CPU cooler connector to the CPU FAN header on the motherboard .



Release bolts of CPU cooler from motherboard :

1. Turning the push pin (bolt) along with the direction of arrow (counterclockwise).
2. Pull the push pin straight up.
3. Turning push pin clockwise to its default position.

NOTE Use extreme care when removing the CPU cooler because the thermal grease may adhere to the CPU. Inadequately removing the CPU cooler may damage the CPU.

2-2 Install the Memory

Read the following guidelines before you begin to install the memory :

- Make sure that the motherboard supports the memory. It is recommended that memory of the same capacity, brand, speed, and chips be used, and please select Dual channel first to achieve optimum performance.
- Always turn off the computer and unplug the power cord from the power outlet before installing the memory to prevent hardware damage.
- Memory modules have a foolproof design. A memory module can be installed in only one direction. If you are unable to insert the memory, switch the direction.

Dual Channel Memory Configuration

Channel 0 : DIMM1
Channel 1 : DIMM2

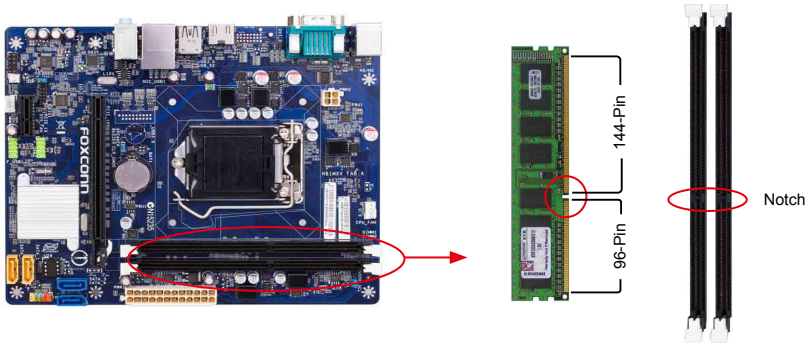
The combinations of DIMM modules are:

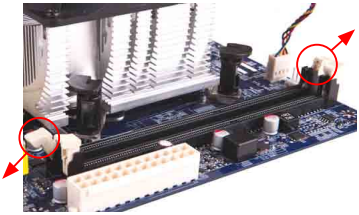
	DIMM1	DIMM2
Single Channel	DS/SS	-
Single Channel	-	DS/SS
Dual Channel	DS/SS	DS/SS

(DS : Double Side, SS : Single Side, - : No Memory)

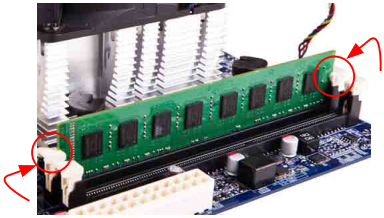
Installing a Memory

If you take a look at front side of memory module, it has asymmetric pin counts on both sides separated by a notch in the middle, so it can only fit in one direction. Follow the steps below to correctly install your memory modules into the sockets.





Step 1:
Spread the clips at both ends of the memory socket. Place the memory module onto the socket, then put your fingers on top edge of the module, and push it down firmly and seat it vertically into the memory socket.

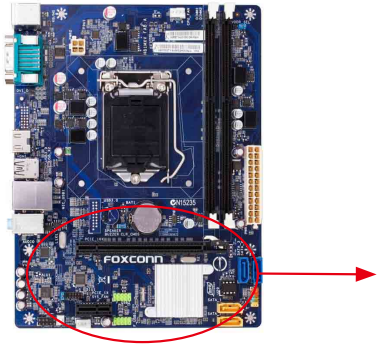


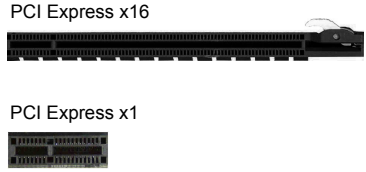
Step 2:
The clips at both ends of the socket will snap into place when the memory module is securely inserted.

2-3 Install an Expansion Card

NOTE

- Make sure the motherboard supports the expansion card.
- Always turn off the computer and unplug the power cord from the power outlet before installing an expansion card to prevent hardware damage.





Follow the steps below to correctly install your expansion card in the expansion slot.

1. Locate an expansion slot that supports your card. Remove the metal slot cover from the chassis back panel.
2. Align the card with the slot, and press down on the card until it is fully seated in the slot.
3. Make sure the metal contacts on the card are completely inserted into the slot.
4. Secure the card's metal bracket to the chassis back panel with a screw.
5. After installing all expansion cards, replace the chassis cover.
6. Turn on your computer. If necessary, go to BIOS Setup to make any required BIOS changes for your expansion card(s).
7. Install the driver provided with the expansion card in your operating system.

Installing and Removing a PCI Express x16 Graphics Card:

• Installing a Graphics Card:
Gently insert the graphics card into the PCI Express x16 slot. Make sure the graphics card is locked by the latch at the end of the PCI Express x16 slot.

• Removing the Card:
Push the latch at the end of the PCI Express x16 slot to release the card and then pull the card straight up from the slot.

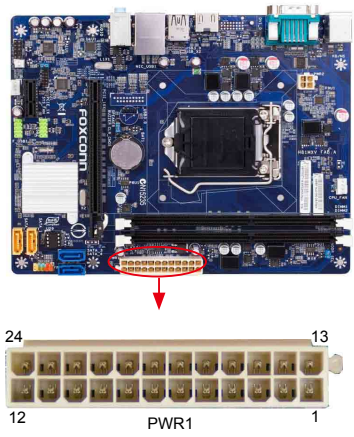
2-4 Install other Internal Connectors

Power Connectors

This motherboard uses an ATX power supply. In order not to damage any device, make sure all the devices have been installed properly before applying the power supply.

24-pin ATX Power Connector: PWR1

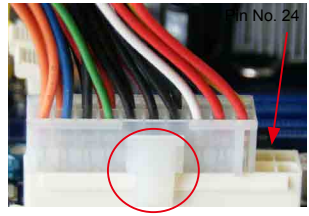
PWR1 is the ATX power supply connector. Make sure that the power supply cable and pins are properly aligned with the connector on the motherboard. Firmly plug the power supply cable into the connector and make sure it is secure.



Pin #	Definition	Pin #	Definition
1	3.3V	13	3.3V
2	3.3V	14	-12V
3	GND	15	GND
4	+5V	16	PS_ON(Soft On/Off)
5	GND	17	GND
6	+5V	18	GND
7	GND	19	GND
8	Power Good	20	NC
9	+5V SB(Stand by +5V)	21	+5V
10	+12V	22	+5V
11	+12V	23	+5V
12	3.3V	24	GND

NOTE

We recommend you using a 24-pin power supply. If you are using a 20-pin power supply, you need to align the ATX power connector according to the picture.



20-Pin Power

4-pin ATX 12 V Power Connector: PWR2

Connect the 4-pin ATX 12V power supply to PWR2 and provides power to the CPU.

PWR2

Pin #	Definition
1	GND
2	GND
3	+12V
4	+12V

Front Panel Header: FP

This motherboard includes one connector for connecting the front panel switch and LED Indicators.

Hard Disk LED Connector (HDD-LED)

Connect to the chassis front panel IDE indicator LED. It indicates the active status of the hard disks. This 2-pin connector is directional with +/- sign.

Reset Switch (RESET-SW)

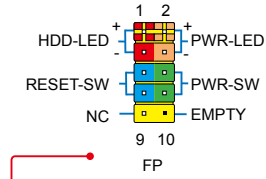
Attach the connector to the Reset switch on the front panel of the case; the system will restart when the switch is pressed.

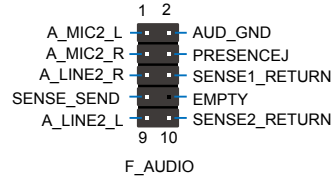
Power LED Connector (PWR-LED)

Connect to the power LED indicator on the front panel of the chassis. The Power LED indicates the system's status. When the system is in operation (S0 status), the LED is on. When the system gets into sleep mode (S1) , the LED is blinking; When the system is in S3/S4 sleep state or power off mode (S5), the LED is off. This 2-pin connector is directional with +/- sign.

Power Switch Connector (PWR-SW)

Connect to the power button on the front panel of the chassis. Push this switch allows the system to be turned on and off rather than using the power supply button.





Audio Header: F_AUDIO

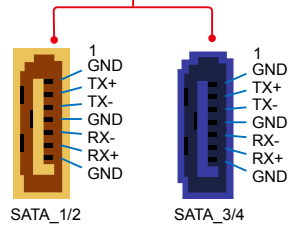
The audio header supports HD Audio standard. It provides the Front Audio output choice.

Serial ATA 3.0 Connectors: SATA_1/2

These connectors are used to connect with SATA 3.0 Hard Disk drives.

Serial ATA 2.0 Connectors: SATA_3/4

These connectors are used to connect with SATA 2.0 Hard Disk drives or optical disc devices.

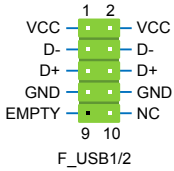


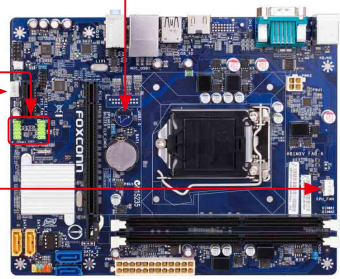
Speaker Header: SPEAKER

The speaker header is used to connect speaker of the chassis.

USB 2.0 Headers: F_USB1/2

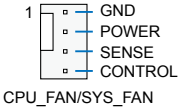
These connectors comply with USB 2.0 specification, you can get USB ports by connecting the USB module cable to any of these connectors.





Fan Headers: CPU_FAN, SYS_FAN

The fan speed can be controlled and monitored in the BIOS Setup. These fans can be automatically turned off after the system enters S3, S4 and S5 sleeping states.



2-5 Jumpers

For some features needed, users can change the jumper settings on this motherboard to modify them. This section explains how to use the various functions of this motherboard by changing the jumper settings. Users should read the following content carefully prior to modifying any jumper setting.

Description of Jumpers

1. For any jumper on this motherboard, pin 1 can be identified by the bold silkscreen next to it. However, in this manual, pin 1 is simply labeled as "1".
2. The following table explains different types of the jumper settings. "Closed" means placing a jumper cap on the two pins to temporarily short them. The shorting can also be done by touching two pins by a screwdriver for a few seconds, but using jumper cap is recommended. It can prevent hazardous ESD (Electrical Static Discharge) problem.

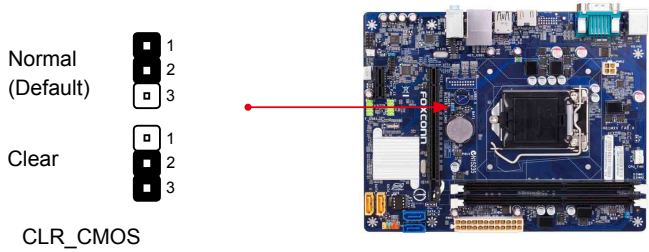
Jumper	Diagram	Definition	Description
1	1	Closed	Set Pin 1 and Pin 2 closed
	1	Open	Set Pin 1 and Pin 2 Open
1	1	1-2	Set Pin 1 and Pin 2 closed
	1	2-3	Set Pin 2 and Pin 3 closed

Clear CMOS Header: CLR_CMOS

The motherboard uses CMOS RAM to store the basic hardware information (such as BIOS data, date, time information, hardware password...etc.). Clear CMOS data is the fast way to go back to factory default when the BIOS settings were mistakenly modified.

The steps to clear CMOS data are :

1. Turn off the computer, unplug the power cord from the power outlet.
2. Remove jumper cap from pins 1-2, put it onto pins 2-3 to short them. This will clear CMOS data.
3. Return the setting to its original with pins 1-2 closed.
4. Plug in the power cord to your computer and turn it on.
5. Go to BIOS Setup to configure new system as described in next chapter.



CAUTION

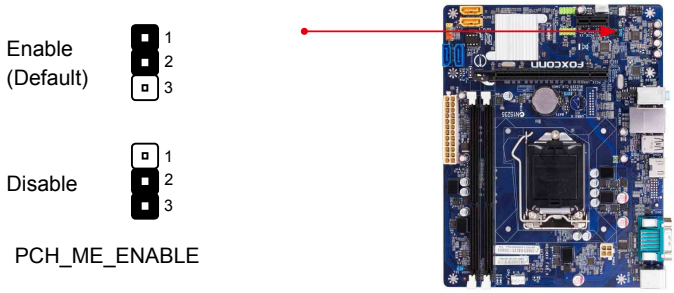
- Disconnect the power cable before adjusting the jumper settings.
- Do not clear the CMOS while the system is turned on.

Intel® ME Jumper: PCH_ME_ENABLE

This motherboard uses this jumper to enable or disable Intel® Management Engine function. Intel® Management Engine (ME) is an embedded microcontroller located in Intel chipset. It provides latest IT management features such as Intel® AMT, that allows to improve management of corporate assets.

Set the jumper to pins 1-2, you can enable the Intel® Management Engine function.

Set the jumper to pins 2-3, you can disable the Intel® Management Engine function.



Definition	Description	Function
1-2(default)	Set Pin 1 and Pin 2 closed	Enable ME function
2-3	Set Pin 2 and Pin 3 closed	Disable ME function

CAUTION

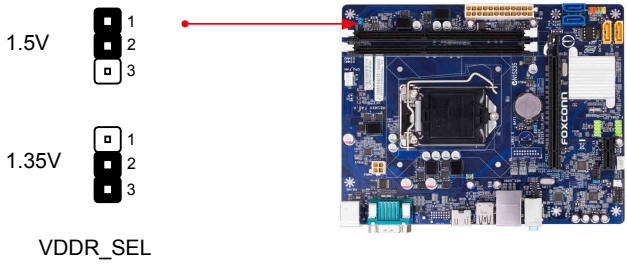
Before flashing BIOS ROM, you need to set ME jumper to pins 2-3 first.

Voltage DDR Select Header: VDDR_SEL

This motherboard uses this jumper to select the voltage for DDR.

Set the jumper to pins 1-2, the DDR3 Power is 1.5V.

Set the jumper to pins 2-3, the DDR3 Power is 1.35V.



Chapter 3 BIOS Setup

This chapter tells how to change system settings through the BIOS Setup menus. Detailed descriptions of the BIOS parameters are also provided.
You have to run the Setup Program when the following cases occur:
1. An error message appears on the screen during the system Power On Self Test (POST) process.
2. You want to change the default CMOS settings.

This chapter includes the following information :

- Enter BIOS Setup
- Main
- Chipset
- Advanced
- Boot
- Power
- Health
- Security
- Exit

Enter BIOS Setup

The BIOS is the communication bridge between hardware and software, correctly setting up the BIOS parameters is critical to maintain optimal system performance. Power on the computer, when the message "**Press <Del> to enter setup, Press <F7> to enter boot menu**" appears at the bottom of the screen, you can press <DEL> key to enter Setup.

We do not suggest that you change the default values in the BIOS Setup, and we shall not be responsible for any damage which resulted from the change you made.

Use the arrow right/left keys to select a specific function and go to the submenu. Each function is explained below:

Main
It displays the basic system configuration, such as CPU Name, memory size, system date, time and so on. They all can be viewed or set up through this menu.

Chipset
The values for the chipset can be changed through this menu, and the system performance can be optimized.

Advanced
The advanced system features can be set up through this menu.

Boot
Boot features can be set up through this menu. You can set the boot device priority here.

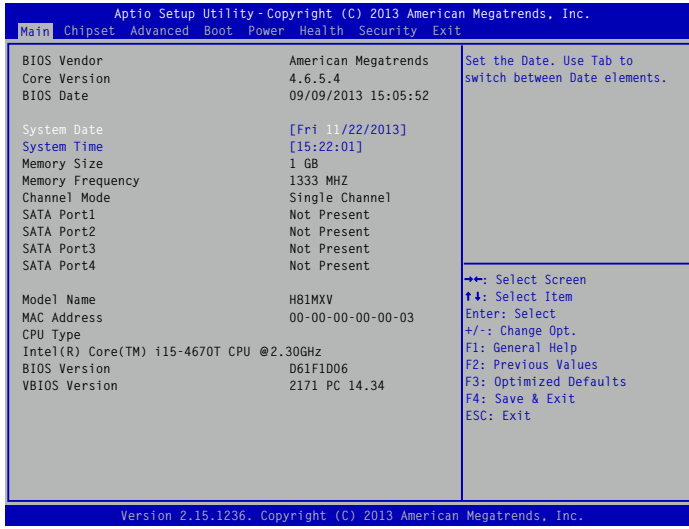
Power
All the items related with Green function features can be setup through this menu.

Health
This setup enables you to read/change fan speeds, and displays temperatures and voltages of your CPU/System.

Security
The Administrator/User password can be set up through this menu to prevent unauthorized use of your computer. If you set a password, the system will ask you to key in correct password before boot or access to Setup.

Exit
The optimal performance settings can be loaded through this menu. However, it may offer better performance in some ways (such as less I/O cards, less memory ...etc.), still, it may cause problem if you have more memory or I/O cards installed. It means, if your system loading is heavy, set to optimal default may sometimes come out an unstable system. What you need now is to adjust BIOS setting one by one, trial and error, to find out the best setting for your current system. You also can save or discard the changes and exit BIOS setup here.

Main



► **System Date**

<weekday><month><date> <year> format.

Day—weekday from Sun. to Sat., this message is automatically displayed by BIOS (Read Only).

Month—month from 1 to 12.

Date—date from 1 to 31.

Year—year, set up by users.

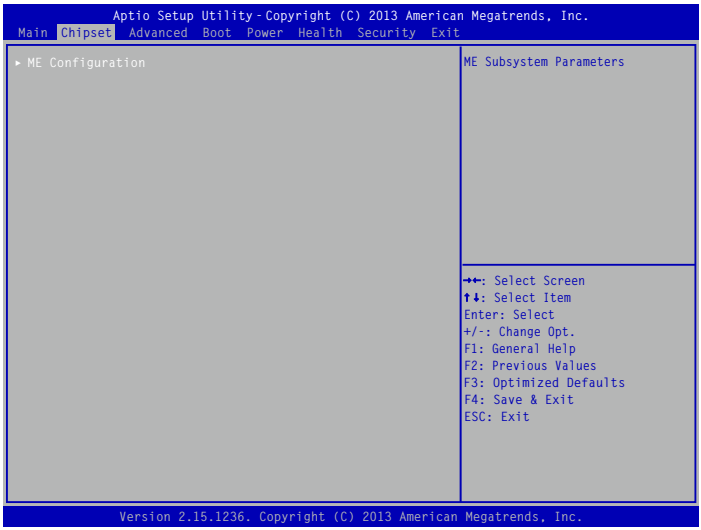
Use [ENTER], [TAB] to select a field. Use [+] or [-] to input the value.

► **System Time**

This item allows you to configure the desired time. Use [ENTER], [TAB] to select a field. Use [+] or [-] to input the value.

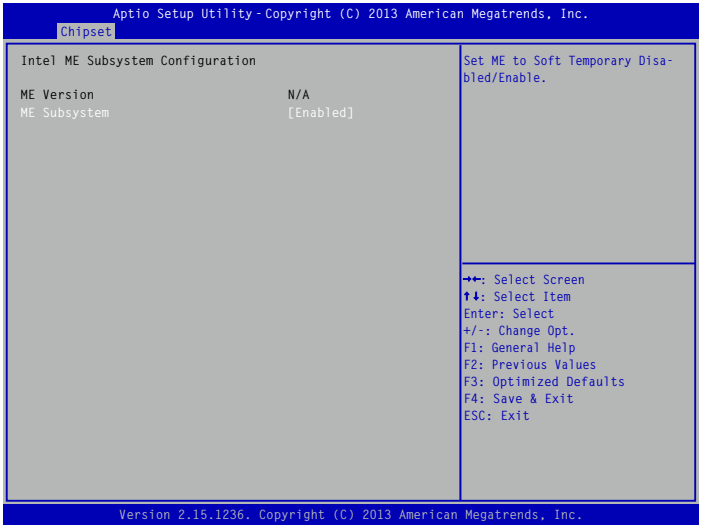
The three fields of the setting are <hour> : <minute> : <second> respectively.

Chipset


Aptio Setup Utility - Copyright (C) 2013 American Megatrends, Inc.
Main Chipset Advanced Boot Power Health Security Exit
▸ ME Configuration
ME Subsystem Parameters
→←: Select Screen
↑↓: Select Item
Enter: Select
+/-: Change Opt.
F1: General Help
F2: Previous Values
F3: Optimized Defaults
F4: Save & Exit
ESC: Exit
Version 2.15.1236. Copyright (C) 2013 American Megatrends, Inc.

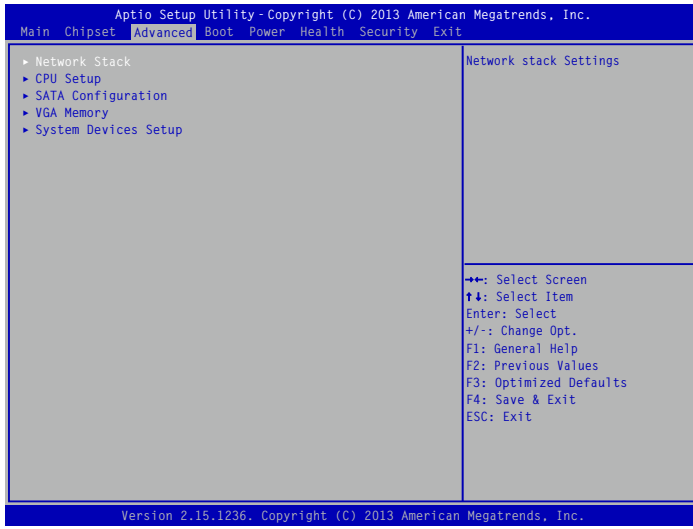
► Me Configuration
Press <Enter> to go to relative submenu.

Me Configuration



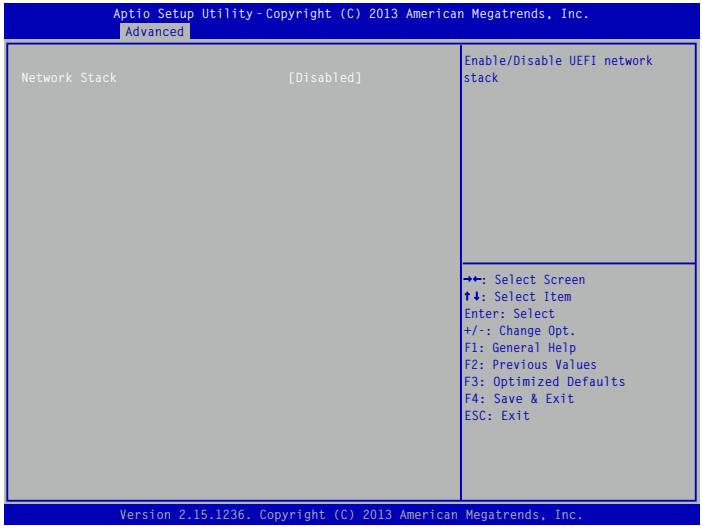
► ME Subsystem
This item is used to enable or disable the ME subsystem.

Advanced



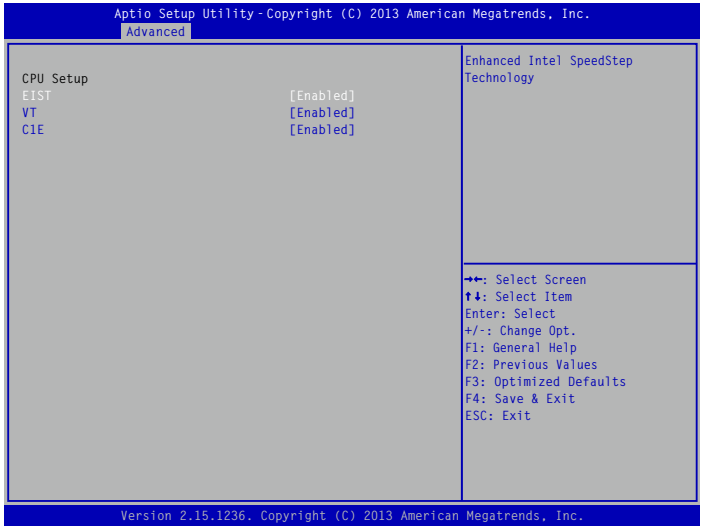
► Network Stack/CPU Setup/SATA Configuration/VGA Memory/System Devices Setup
Press <Enter> to go to relative submenu.

Network Stack



► Network stack
This item is used to enable/disable UEFI network stack.
The UEFI(Unified Extensible Firmware Interface)Network Stack implements the TCP/IP network interfaces such as SNP, MNP,ARP, IP, UDP, DHCP, MTFTP, and TCP.

CPU Setup



► EIST

You can select the EIST (Processor Power Management, PPM) through this item.

CAUTION

Enhanced Intel SpeedStep® technology (EIST) allows the system to dynamically adjust processor voltage and core frequency, which can result in decreased average power consumption and decreased average heat production. There are some system requirements must be met, including CPU, chipset, motherboard, BIOS and operation system. Please refer to Intel Website for more information.

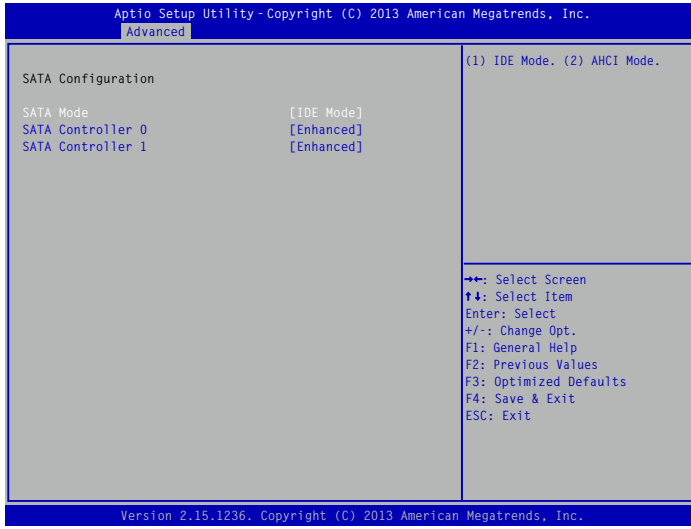
► VT

This item is used to enable or disable VT. When enabled, a VMM can utilize the additional hardware capabilities provided by Vanderpool Technology.

► C1E

This item is used to enable or disable C1E.

SATA Configuration



► SATA Mode

This item is used to set the operating mode of your SATA ports.

[IDE] - This configures the SATA ports to support native IDE mode.

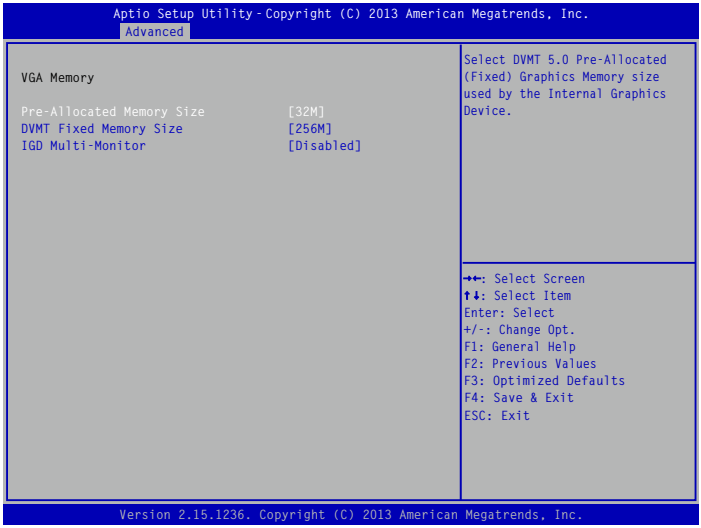
[AHCI] - The Advanced Host Controller Interface (AHCI) specification describes the register level interface for a Host Controller for Serial ATA. The specification includes a description of the hardware/software interface between system software and the host controller hardware. AHCI provides more advanced features including SATA features, but some SATA drives may not support AHCI, unless they are labeled with AHCI support in its specification.

If your motherboard supporting AHCI, and you have a SATA device, which also supports AHCI, then you can select IDE option to have fair performance (only PATA, SATA level), or you can select AHCI to get its best performance.

► SATA Controller 0/1

This item is used to disable or compatible or enhance the SATA controller.

VGA Memory

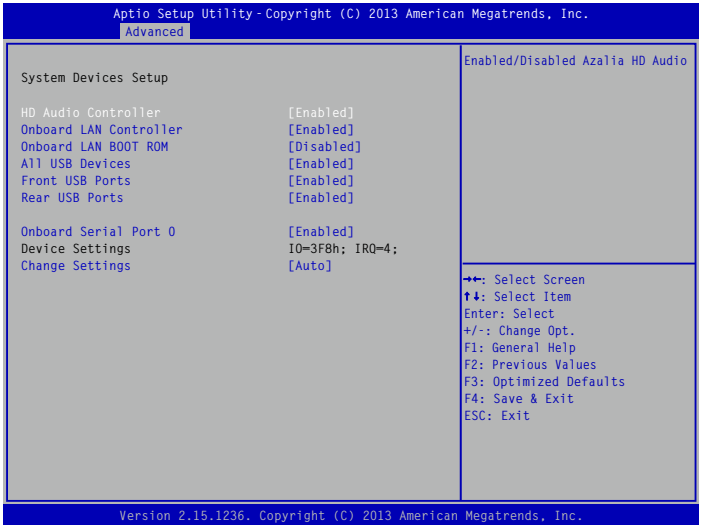

Aptio Setup Utility - Copyright (C) 2013 American Megatrends, Inc.
Advanced
VGA Memory
Pre-Allocated Memory Size [32M]
DVMT Fixed Memory Size [256M]
IGD Multi-Monitor [Disabled]
Select DVMT 5.0 Pre-Allocated (Fixed) Graphics Memory size used by the Internal Graphics Device.
→←: Select Screen
↑↓: Select Item
Enter: Select
+/-: Change Opt.
F1: General Help
F2: Previous Values
F3: Optimized Defaults
F4: Save & Exit
ESC: Exit
Version 2.15.1236. Copyright (C) 2013 American Megatrends, Inc.

► Pre-Allocated Memory Size
This item is used to select Pre-Allocated Memory Size used by internal graphics device.

► DVMT Fixed Memory Size
This item is used to select DVMT Fixed memory size used by internal graphics device.

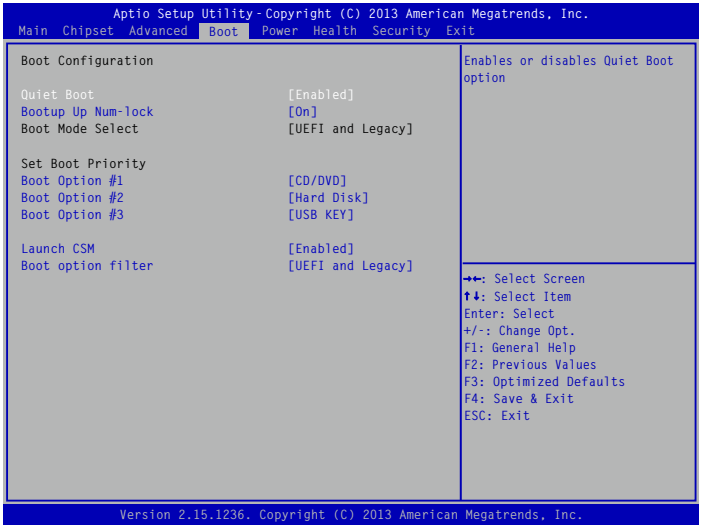
► IGD Multi-Monitor
This item is used to enable or disable the IGD Multi-Monitor by internal graphics device.

System Devices Setup



► HD Audio controller
This item is used to enable or disable the Azalia HD Audio Controller.
► Onboard LAN Controller
This item is used to enable or disable the onboard LAN controller
► Onboard LAN BOOT ROM
This item is used to enable or disable Boot Option for Legacy Network Devices.
► All USB Devices
This item is used to enable or disable all USB devices.
► Front USB ports
This item is used to enable or disable front USB ports.
► Rear USB ports
This item is used to enable or disable rear USB ports.
► Onboard Serial Port 0
This item is used to enable or disable the serial port (COM).
► Change Settings
This item is used to select an optimal settings for Super IO device.

Boot


Aptio Setup Utility - Copyright (C) 2013 American Megatrends, Inc.
Main Chipset Advanced Boot Power Health Security Exit
Boot Configuration
Quiet Boot [Enabled]
Bootup Up Num-lock [On]
Boot Mode Select [UEFI and Legacy]
Set Boot Priority
Boot Option #1 [CD/DVD]
Boot Option #2 [Hard Disk]
Boot Option #3 [USB KEY]
Launch CSM [Enabled]
Boot option filter [UEFI and Legacy]
Enables or disables Quiet Boot option
→←: Select Screen
↑↓: Select Item
Enter: Select
+/-: Change Opt.
F1: General Help
F2: Previous Values
F3: Optimized Defaults
F4: Save & Exit
ESC: Exit
Version 2.15.1236. Copyright (C) 2013 American Megatrends, Inc.

► Quiet Boot
This item is used to enable or disable the quiet boot.
[Disabled] : Displays the normal POST messages.
[Enabled] : Displays OEM customer logo instead of POST messages.

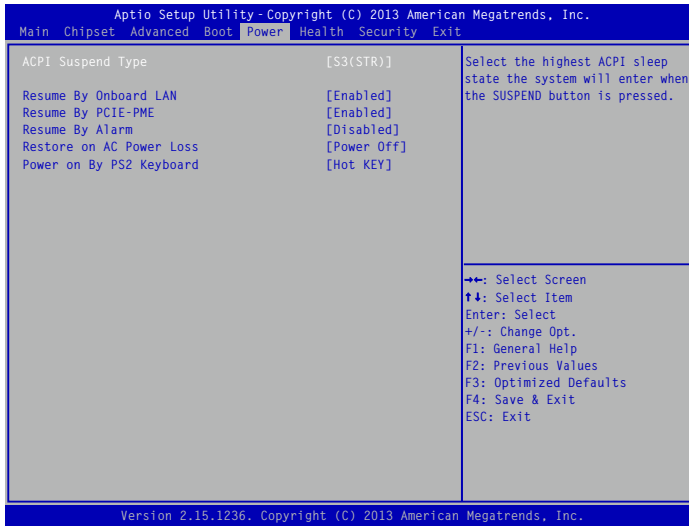
► Bootup Up Num-lock
This item defines if the keyboard Num Lock key is active when your system is started. The available settings are: On (default) and Off.

► Set Boot Priority
These items are used to set the system boot order.

► Launch CSM
This item controls if CSM will be launched.

► Boot option filter
This item controls what devices system can boot to.

Power


Aptio Setup Utility - Copyright (C) 2013 American Megatrends, Inc.
Main Chipset Advanced Boot Power Health Security Exit
ACPI Suspend Type [S3(STR)]
Resume By Onboard LAN [Enabled]
Resume By PCIE-PME [Enabled]
Resume By Alarm [Disabled]
Restore on AC Power Loss [Power Off]
Power on By PS2 Keyboard [Hot KEY]
Select the highest ACPI sleep state the system will enter when the SUSPEND button is pressed.
→←: Select Screen
↑↓: Select Item
Enter: Select
+/-: Change Opt.
F1: General Help
F2: Previous Values
F3: Optimized Defaults
F4: Save & Exit
ESC: Exit
Version 2.15.1236. Copyright (C) 2013 American Megatrends, Inc.

ACPI (Advanced Configuration and Power Interface) is an open industry standard interfaces enabling OS-directed configuration, power management, and thermal management of mobile, desktop, and server platforms. It defines five sleeping states, they are :

S1 - The S1 sleeping state is a low wake latency sleeping state. In this state, no system context is lost (CPU or chip set) and hardware maintains all system context. (also called Power On Suspend)

S2 - The S2 sleeping state is a low wake latency sleeping state. This state is similar to the S1 sleeping state except that the CPU and system cache context is lost (the OS is responsible for maintaining the caches and CPU context). Control starts from the processor's reset vector after the wake event.

S3 - The S3 sleeping state is a low wake latency sleeping state where all system context is lost except system memory. CPU, cache, and chip set context are lost in this state. Hardware maintains memory context and restores some CPU and L2 configuration context. Control starts from the processor's reset vector after the wake event. (also called Suspend to RAM)

S4 - The S4 sleeping state is the lowest power, longest wake latency sleeping state supported by ACPI. In order to reduce power to a minimum, it is assumed that the hardware platform has powered off all devices. Platform context is maintained. (also called Suspend to Disk)

S5 - The S5 state is similar to the S4 state except that the OS does not save any context. The system is in the "soft" off state and requires a complete boot when it wakes. Software uses a different state value to distinguish between the S5 state and the S4 state to allow for initial boot operations within the BIOS to distinguish whether or not the boot is going to wake from a saved memory image.

► ACPI Suspend Type

This item is used to set the energy saving mode of the ACPI function. When you select "S1 (POS)" mode, the power is always on and computer can be resumed at any time. When you select "S3 (STR)" mode, the power will be down after a period of time. The status of the computer before it entering STR will be saved in memory, and the computer can quickly

return to previous state when the STR function wakes.

► Resume By Onboard LAN
This item is used to enable or disable the onboard LAN to generate a wake up.

► Resume By PCIE-PME
This item is used to enable or disable the PCI Express device to generate a wake up.

► Resume By Alarm
This item is used to enable or disable RTC alarm event to generate a wake up.
RTC is system real time clock.

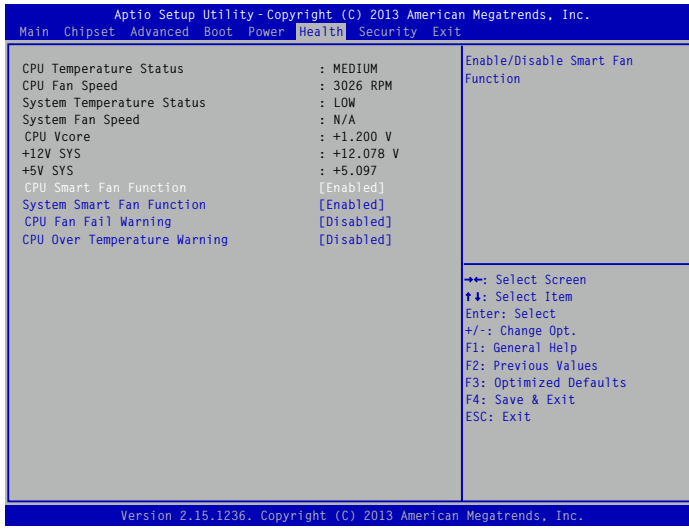
► RTC Alarm Date(Days)
When Resume by RTC is enabled, select a specific date to generate a wake up.

► RTC Alarm Time(HH:MM:SS)
When Resume by RTC is enabled, select a specific time to generate a wake up.

► Restore on AC Power Loss
This item is used to set which state the PC will take with when it resumes after an AC power loss.

► Power on By PS2 Keyboard
This item is used to enable or disable the PS2 keyboard to generate a wake up.

Health


Aptio Setup Utility - Copyright (C) 2013 American Megatrends, Inc.
Main Chipset Advanced Boot Power Health Security Exit
CPU Temperature Status : MEDIUM
CPU Fan Speed : 3026 RPM
System Temperature Status : LOW
System Fan Speed : N/A
CPU Vcore : +1.200 V
+12V SYS : +12.078 V
+5V SYS : +5.097
CPU Smart Fan Function [Enabled]
System Smart Fan Function [Enabled]
CPU Fan Fail Warning [Disabled]
CPU Over Temperature Warning [Disabled]
Enable/Disable Smart Fan Function
→←: Select Screen
↑↓: Select Item
Enter: Select
+/-: Change Opt.
F1: General Help
F2: Previous Values
F3: Optimized Defaults
F4: Save & Exit
ESC: Exit
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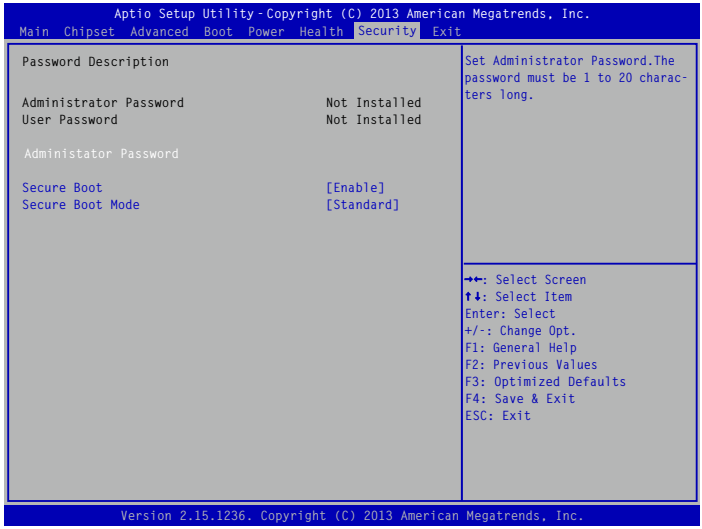
► CPU Smart Fan Function
This option is used to enable or disable CPU smart fan function.

► System Smart Fan Function
This option is used to enable or disable system smart fan function.

► CPU Fan Fail Warning
This item is used to enable or disable CPU Fan Fail Warning.

► CPU Over Temperature Warning
This item is used to enable or disable CPU Over Temperature Warning.

Security


Aptio Setup Utility - Copyright (C) 2013 American Megatrends, Inc.
Main Chipset Advanced Boot Power Health Security Exit
Password Description
Administrator Password Not Installed
User Password Not Installed
Administator Password
Secure Boot [Enable]
Secure Boot Mode [Standard]
Set Administrator Password.The password must be 1 to 20 characters long.
→←: Select Screen
↑↓: Select Item
Enter: Select
+/-: Change Opt.
F1: General Help
F2: Previous Values
F3: Optimized Defaults
F4: Save & Exit
ESC: Exit
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► Administrator Password

This item is used to install or change administrator password.

After you input administrator password, it then will ask you to confirm the password.

► User Password

This item is used to install or change user password.

Only when there exists a Administrator password, then this setting can be activated.

► Secure Boot

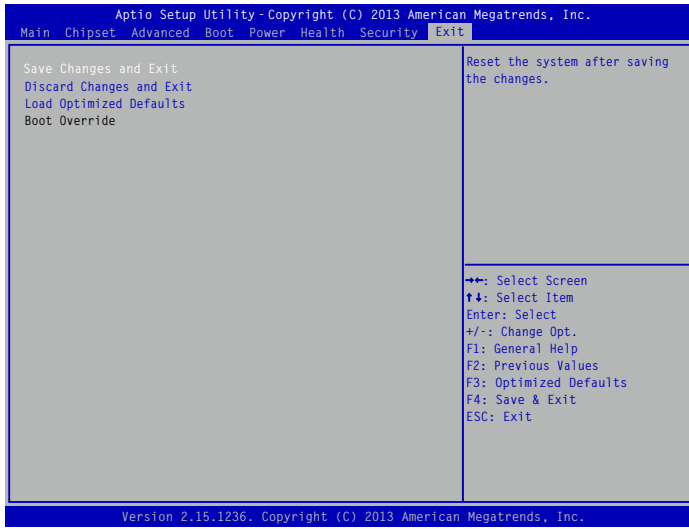
This item is used to enable or disable Secure Boot control. Secure Boot is possible only if system runs in User Mode.

► Secure Boot Mode

This item is used to select Secure Boot Mode.

The detailed parameter submenus will appear when you select “Custom” Mode.

Exit


Aptio Setup Utility - Copyright (C) 2013 American Megatrends, Inc.
Main Chipset Advanced Boot Power Health Security Exit
Save Changes and Exit
Discard Changes and Exit
Load Optimized Defaults
Boot Override
Reset the system after saving the changes.
→←: Select Screen
↑↓: Select Item
Enter: Select
+/-: Change Opt.
F1: General Help
F2: Previous Values
F3: Optimized Defaults
F4: Save & Exit
ESC: Exit
Version 2.15.1236. Copyright (C) 2013 American Megatrends, Inc.

► Save Changes and Exit

If you select this option and press <Enter>, a message will be displayed in the screen. Select [Yes] to save your changes and reset computer, select [No] or <ESC> to return to the main menu.

► Discard Changes and Exit

If you select this option and press <Enter>, a message will be displayed in the screen. Select [Yes] to exit setup utility and reset computer without saving your modifications, select [No] or <ESC> to return to the main menu.

► Restore Optimized Defaults

Optimal defaults are the best settings of this motherboard.

Always load the Optimal defaults after updating the BIOS or after clearing the CMOS values. Select this option and press Enter, it will pop out a dialogue box to let you load the defaults. Select <Yes> and then press <Enter> to load the defaults. Select <No> and press <Enter>, it will not load.

By this default, BIOS have set the optimal performance parameters of system to improve the performances of system components. But if the optimal performance parameters to be set cannot be supported by your hardware devices (for example, too many expansion cards were installed), the system might fail to work.

► Boot Override

BIOS auto detect the presence of connected devices, select the device you want to boot from and press <Enter>, then the system will directly boot from the selected devices.

Chapter 4 CD Instruction

The utility CD that comes with the motherboard contains useful software and several utility drivers that enhance the motherboard features.

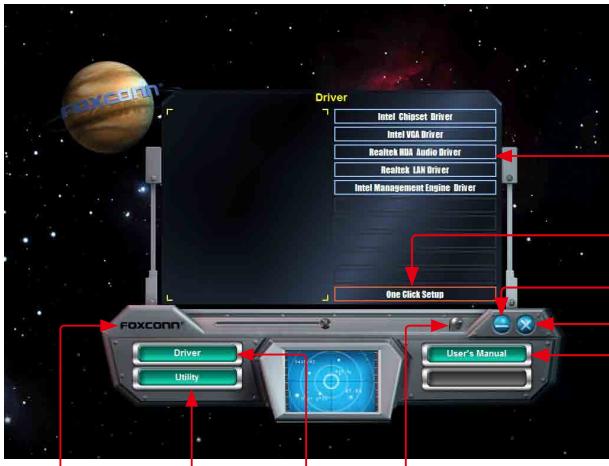
This chapter includes the following information:

- Install driver and utility
- FOX ONE
- FOX LiveUpdate
- FOX LOGO
- FOX DMI

4-1 Install driver and utility

1. Install Driver

Use these options to install all the drivers for your system. You must click "Intel Chipset Driver" to install it first. After that, you can click “One Click Setup” and then choose the items you want to install, or you can click on each individual driver to install it manually.



Manual Installation Step by Step

Automatic Installation by One Click

Drop to System Tray

Exit the program

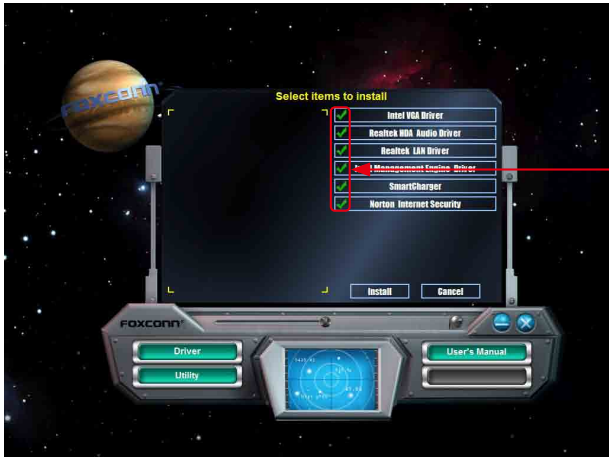
Visit Foxconn's website

Show Utilities

Show Drivers

Browse CD

View User’s Manual



Choose the items you want to Install

2. Install Utility

Use these options to install additional software programs. And click “User’s Manual“ button to view the product manual.

NOTE The Driver and Utility items displayed above represent a Windows 8.1 based system. The appearance may change with different Operating Systems.

4-2 FOX ONE

FOX ONE is a powerful utility for easily modifying system settings. It also allows users to monitor various temperature values, voltage values, frequencies and fan speeds at any time.

With FOX ONE, you can :

- Monitor hardware temperatures, voltages, frequencies and fan speeds.

Supporting Operating Systems :

- Windows 7 (32-bit and 64-bit)
- Windows 8.1 (32-bit and 64-bit)

NOTE Depending on hardware support, voltage monitoring and Fox Intelligent Stepping features are optional and only supported in some models. If the option is selectable, it also means the feature is supported.

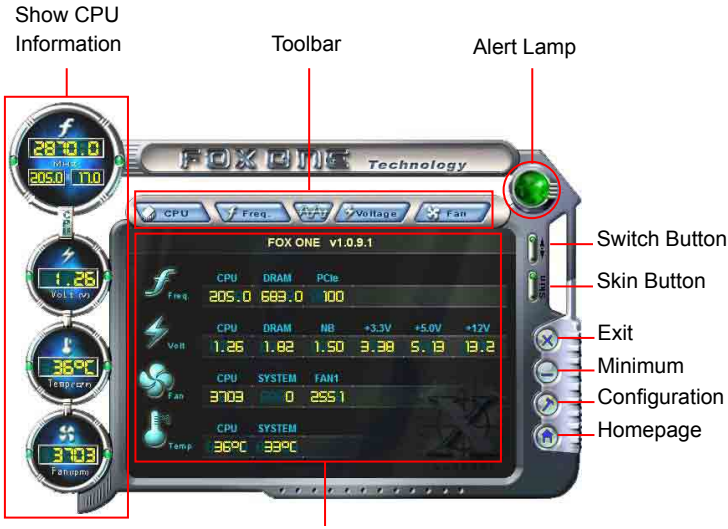
- Voltage Monitoring is supported only in FOX ONE Premium & Deluxe products.
- Fox Intelligent Stepping is supported only in FOX ONE Deluxe products.

Using FOX ONE :
The very first time you run FOX ONE, F.I.S. Calibration function (FOX Intelligent Stepping) will require you to calibrate the CPU's loading. Click "OK" to proceed and start the Utility. F.I.S. is a feature of FOX ONE, which can automatically adjust your CPU clock based on your current system loading.

F.I.S. Calibration
(FOX Intelligent Stepping)
To run this program for the very first time, it need to calibrate the CPU's loading.
And it may take several minutes to process.
Please keep the system as calm as possible during calibrating.
OK

NOTE Before you running the FOX ONE program, the system parameters (such as CPU clock, voltage...etc.) are controlled by BIOS settings. After you run FOX ONE, it will take over, and the controlling right will be transferred to FOX ONE. Later, if you exit FOX ONE, then BIOS control will be back again.

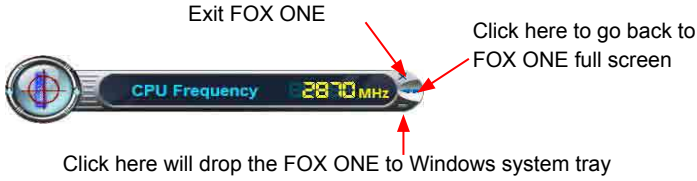
1. Main Page



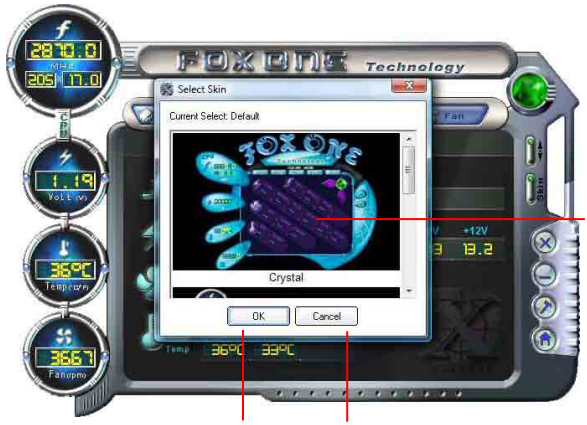
Toolbar
Use the toolbar to navigate to other pages.

Alert Lamp
When the system is in healthy state, the color of alert lamp is green. When the system is in abnormal state, the alert lamp color is red.

Switch Button
Click this button, it will simplify the whole FOX ONE control panel to a smaller information bar (i.e. Simple Mode) as depicted below, you can drag this bar to any place on your screen to help you monitoring system status.


Exit FOX ONE
Click here to go back to FOX ONE full screen
CPU Frequency
Click here will drop the FOX ONE to Windows system tray

Skin Button
There are more choices of FOX ONE screen panels. Click this button, you can select your favorite skin (FOX ONE Panel).



Exit

Click this button to exit the program.

Minimum

Click this button to drop the FOX ONE to Windows system tray located at the lower right corner of your screen.

Homepage

Click this button to visit Foxconn motherboard website :
http://www.foxconnchannel.com

Configuration

1). Monitor interval (ms) :
This is to define the interval of different messages of system settings which are to be displayed on Simple Mode screen. Minimum value is 1 second.

2). Simple Mode :

To select which message of system settings are to be displayed in the Simple Mode. Messages such as CPU frequency, voltage...etc., they can be displayed one by one in Simple Mode.

3). F.I.S. Calibration (FOX Intelligent Stepping, Optional):

This function will re-calibrate the CPU's loading, and it may take several minutes to proceed. The FOX ONE calibration process will apply different loadings to your CPU, record PWM IC voltage together with the CPU clock running at these loadings, so it can define and estimate within a particular range of system loading, what the CPU clock should be.

Step 1 : Click Calibration icon, a message pops out to ask for continue. Select Yes.

Step 2 : After data is collected, it will ask you to restart your computer now.

Later on, when the FOX ONE program is activated, and F.I.S. feature (in CPU Page) is also enabled, FOX ONE will automatically adjust your CPU clock according to your system loadings. (Loadings are like Power Gaming, Data Mining...etc.)

2. CPU Page - CPU Control

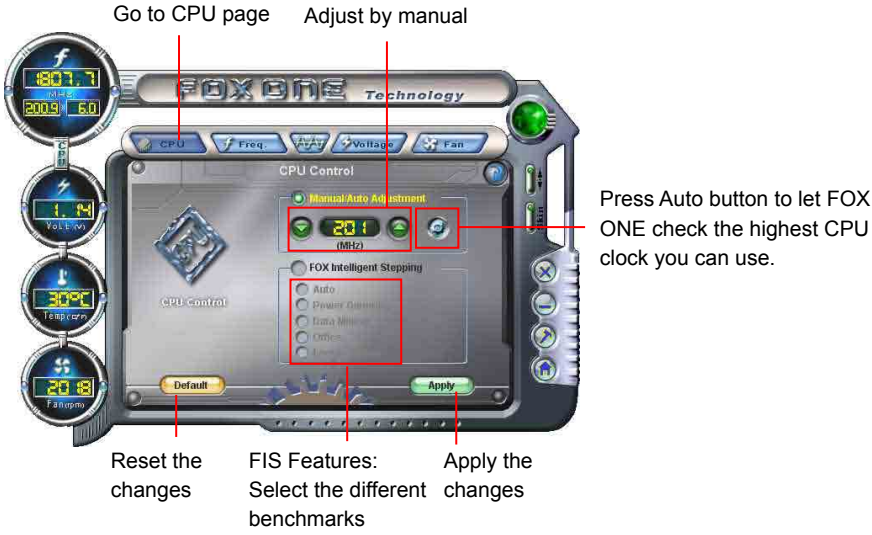
This page lets you select (or overclock) CPU clock to meet the current performance level of the system. The fastest and suitable CPU clock running for current system can be calculated by FOX ONE automatically or manually input by yourselves.

Manual :

You can press the up/down button to adjust your CPU clock.

Auto :

Click this button to let FOX ONE check the highest CPU clock you can use. System will raise the CPU clock step by step until it hangs, you can then push the RESET button on your PC panel to restart the system. When system restarts, run FOX ONE again, it will display a recommended highest CPU clock for you, click <Yes> to apply it.



A message informs you to push RESET button later if the system hangs finally. Click Yes to continue.

You can see the system is raising CPU clock until the system hangs.
Push RESET button on the front panel of your system to restart the computer.

Run FOX ONE program again, it will inform you the previous test found that 255MHz is the recommended CPU clock for your system.
Click Yes to apply it to your system.

Now, your system is running at a CPU clock of 255MHz.

FOX Intelligent Stepping (F.I.S., Optional)

Select FOX Intelligent Stepping will allow your system to automatically adjust your CPU clock rate based on different system loadings. For example, if you select Power Gaming, CPU clock will be driven to run at its maximum speed. While in Energy Saving, CPU will lower down its speed to a minimum. The four benchmarks - Power Gaming, Data Mining, Office and Energy Saving, the references of their system loading were calculated and defined in the FIS Calibration option of Configuration menu. Select Auto, CPU will automatically adjust its clock according to current system loading.

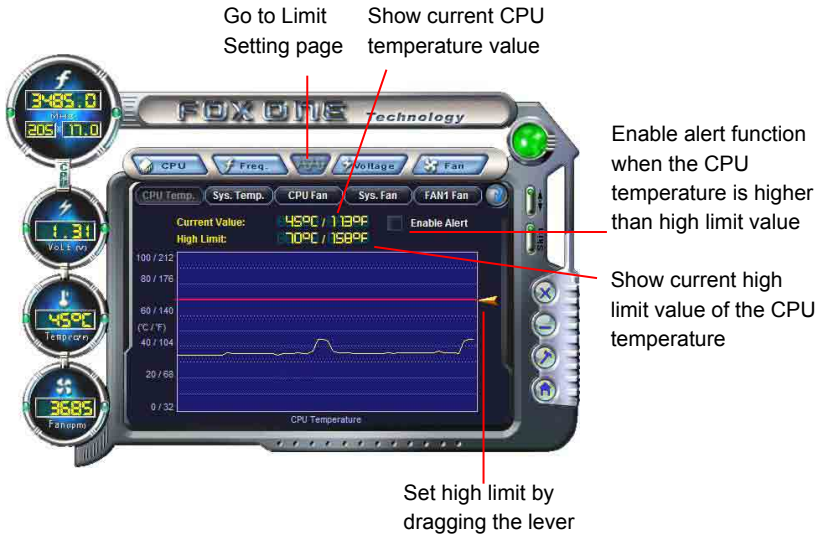
3. Frequency Page - Frequency Control (Optional)

This page lets you set memory and PCI Express frequencies by manual.

4. Limit Setting

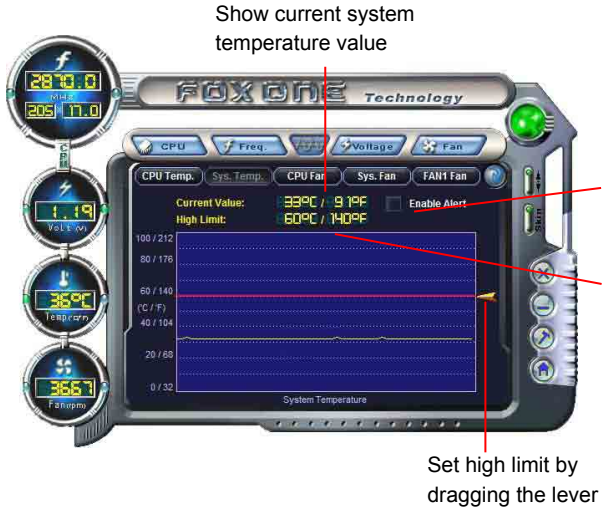
4.1 Limit Setting - CPU Temperature

This page lets you to set CPU high limit temperature and enable the alert function.


Go to Limit Setting page
Show current CPU temperature value
Enable alert function when the CPU temperature is higher than high limit value
Show current high limit value of the CPU temperature
Set high limit by dragging the lever
CPU Temp.
Sys. Temp.
CPU Fan
Sys. Fan
FAN1 Fan
Current Value:
High Limit:
Enable Alert
CPU Temperature

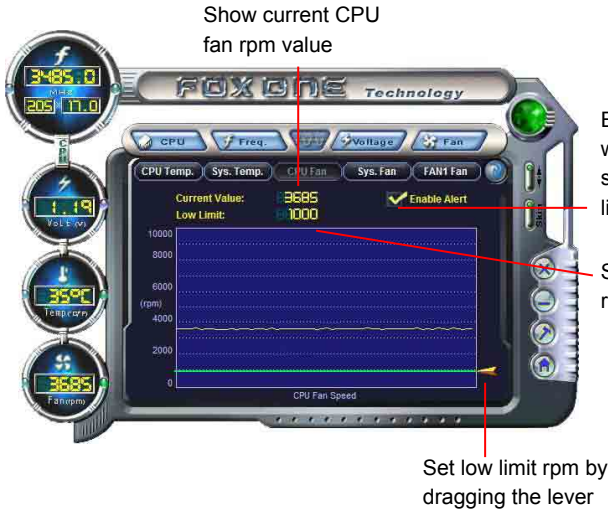
4.2 Limit Setting - System Temperature

This page lets you to set system high limit temperature and enable the alert function.



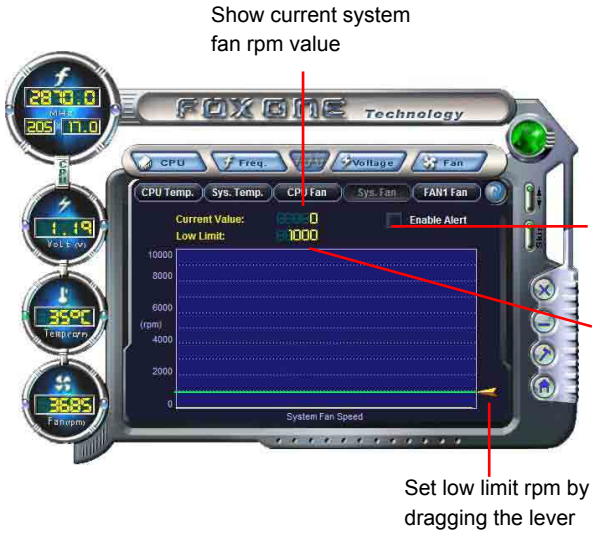
4.3 Limit Setting - CPU Fan

This page lets you to set CPU fan low limit rpm and enable the alert function.



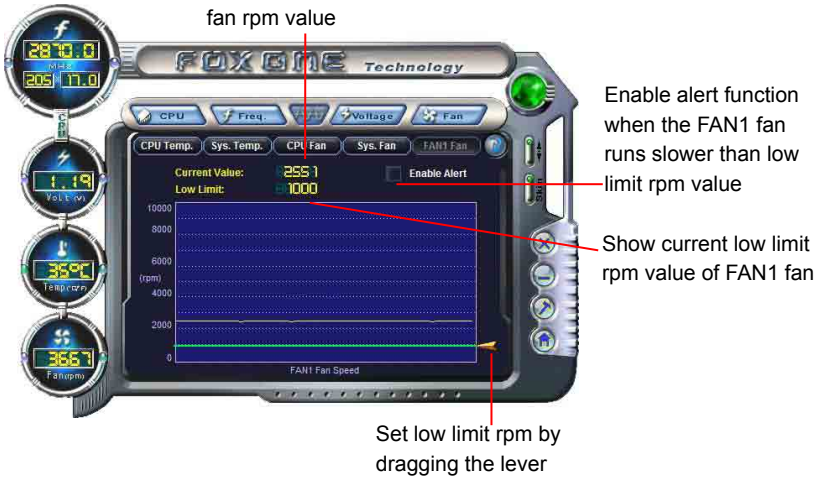
4.4 Limit Setting - System Fan

This page lets you to set system fan low limit rpm and enable the alert function.



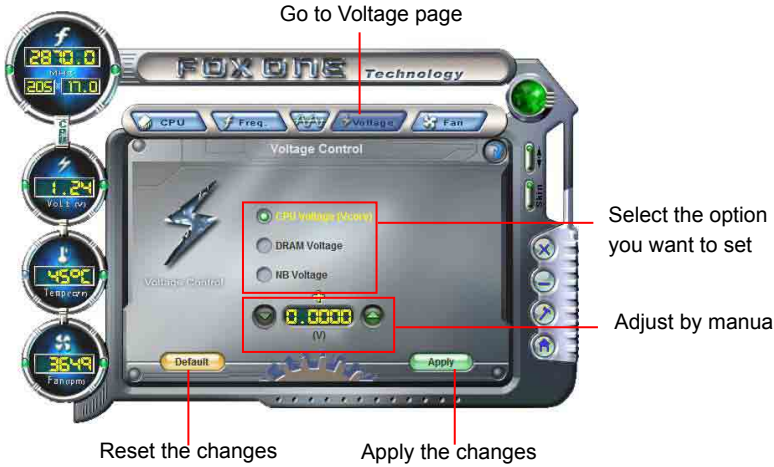
4.5 Limit Setting - FAN1 Fan

This page lets you to set FAN1 fan low limit rpm and enable the alert function.



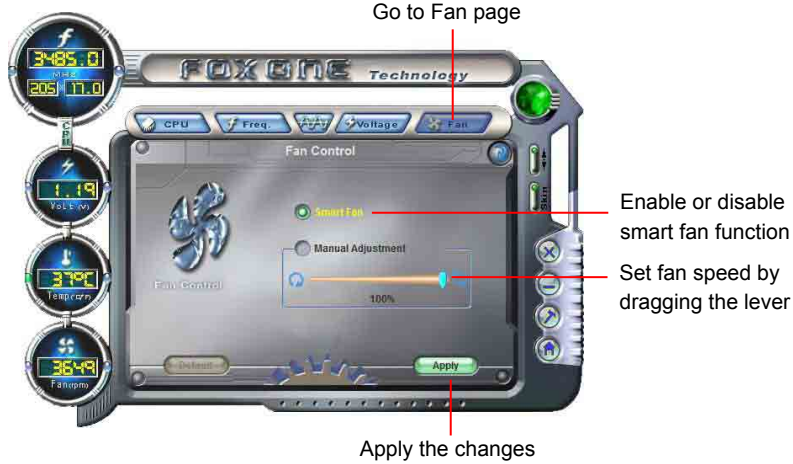
5. Voltage Page - Voltage Control (Optional)

This page lets you set CPU voltage, memory voltage and North Bridge voltage manually. CPU voltage can be stepped up/down by a unit of 12.5mV, while memory is 0.05V/step, and North Bridge is 0.04V/step.



6. Fan Page - Fan Control

This page lets you enable Smart Fan function or set the fan speed by manual.
When Smart Fan is selected, you must use a 4-pin CPU cooler in your system.



4-3 FOX LiveUpdate

FOX LiveUpdate is a useful utility to backup and update your system BIOS, drivers and utilities by local or online.

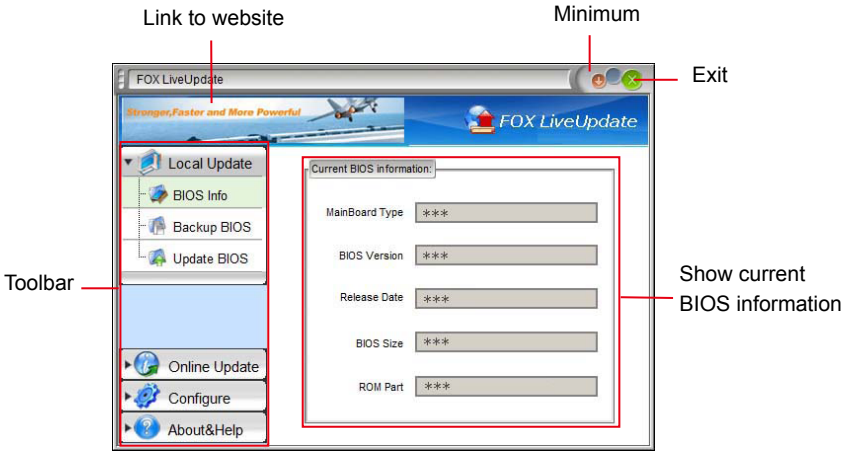
Supporting Operating Systems :

- Windows 7 (32-bit and 64-bit)
- Windows 8.1 (32-bit and 64-bit)

NOTE Please set the BIOS setting “BIOS Write Protect” or “Super BIOS Protect” to [Disabled] when running this application.

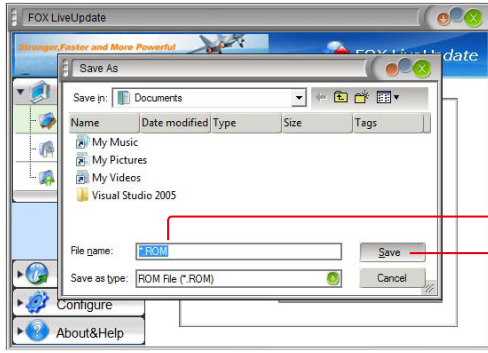
1. Local Update

1-1 Local Update - BIOS Information
This page lets you know your system BIOS information.



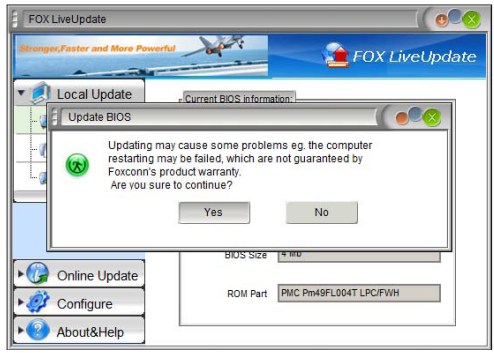
*** : Please refer to the physical motherboard for detail.

1-2 Local Update - Backup
This page can backup your system BIOS. You can click “Backup”, and key in a file name, then click “Save” to finish the backup operation. The extension of this backup file is ".BIN" for Award BIOS and ".ROM" for AMI BIOS. Make sure you can remember the file name together with the directory which it is stored, prevented that you may need them to recover your BIOS later.



1-3 Local Update - Update

This page helps you to update your BIOS from a local file. After click “Update”, An alert message will be displayed to ensure if you really want to continue, click “Yes” to confirm. A setup wizard will guide you to load a local BIOS file to finish the operation. You must remember from which directory to load your new BIOS file (with an extension of ".BIN" for Award BIOS, ".ROM" for AMI BIOS) before the setup wizard starts.

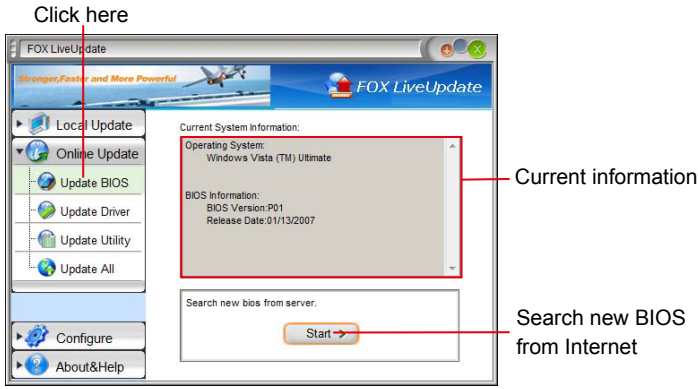


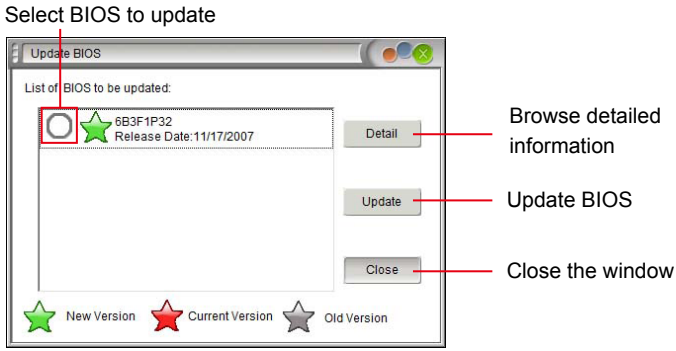
NOTE FOX LiveUpdate can automatically backup old BIOS before update. This feature can be enabled in the "Configure-System" setup. Please refer to "Configure-System" section for more detail. The default backup directory is C:\LiveUpdate_Temp, but the backup file name will be automatically generated. It is hard to find it out from a backup directory, and we recommend you using Explorer to check date/time message of this backup file to find it out and write its name down to remember it.

2. Online Update

2-1 Online Update - Update BIOS

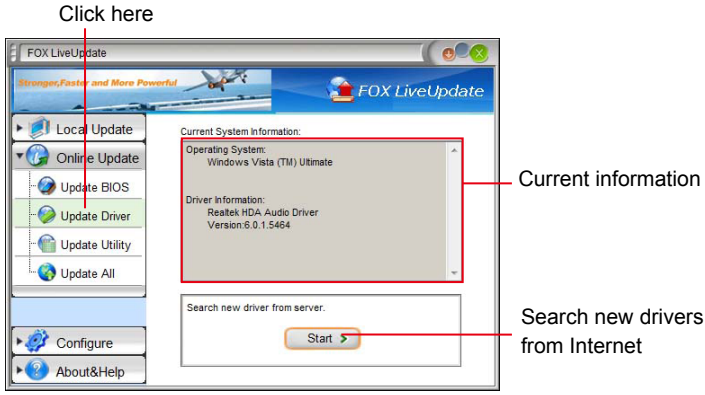
This page lets you update your system BIOS from Internet. Click “Start”, it will search the new BIOS from Internet. Then follow the wizard to finish the update operation.

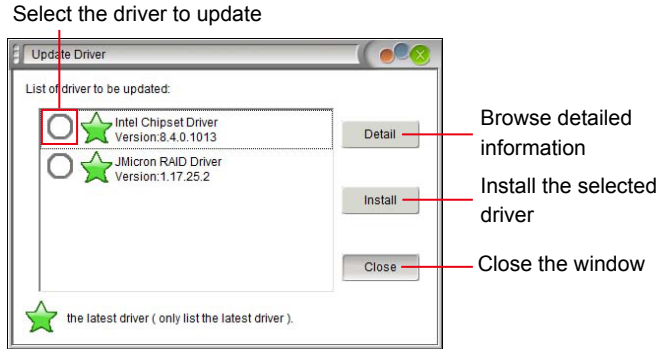




2-2 Online Update - Update Driver

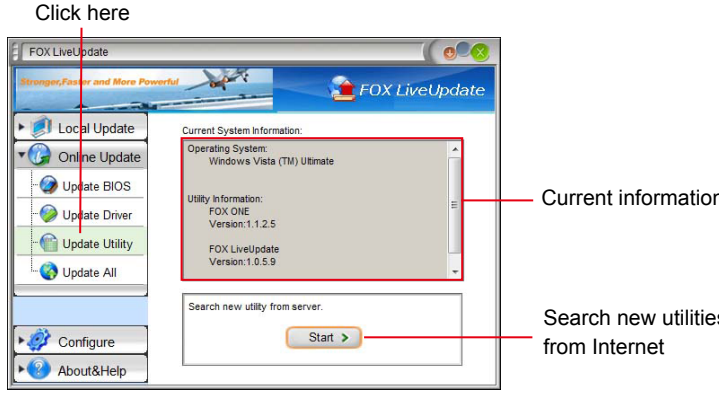
This page lets you update your system drivers from Internet. Click “Start”, it will search the new drivers from Internet. Then follow the wizard to finish the update operation.

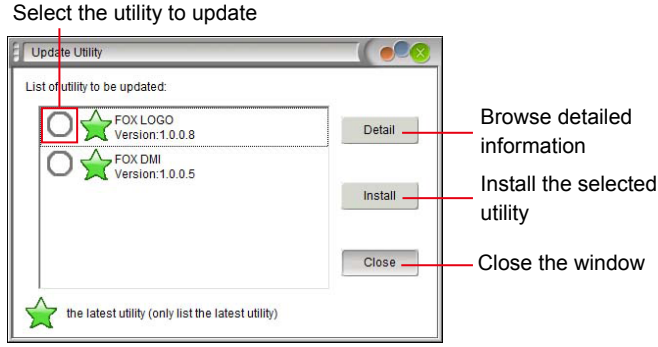




2-3 Online Update - Update Utility

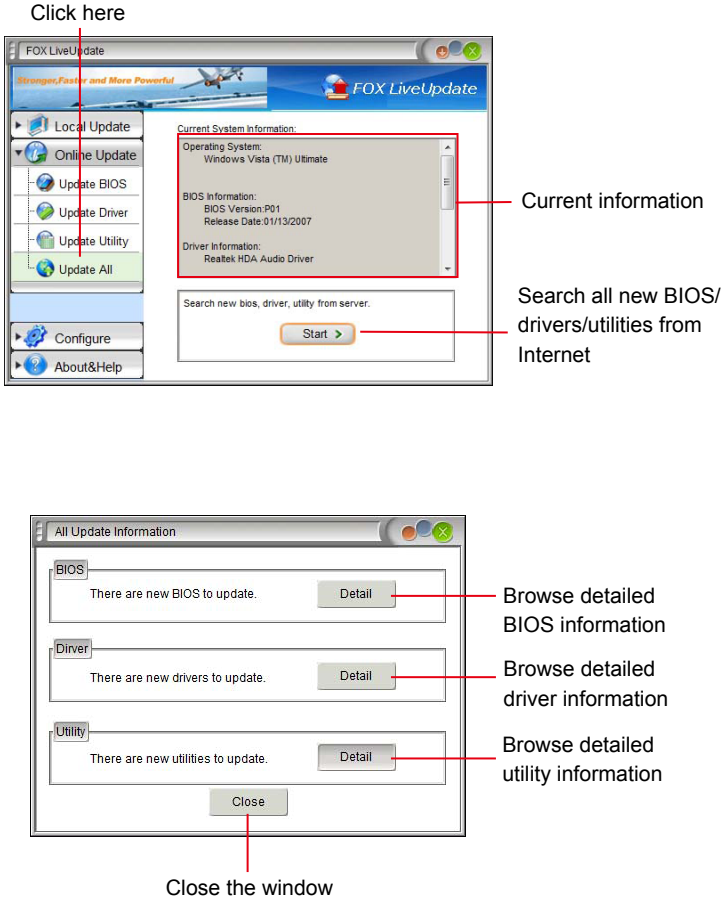
This page lets you update utilities from Internet. Click “Start”, it will search the new utilities from Internet. Then follow the wizard to finish the update operation.





2-4 Online Update - Update All

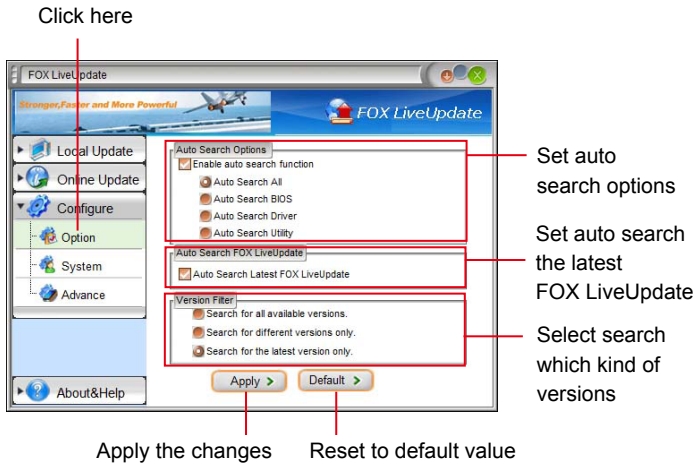
This page lets you update your system drivers from Internet. Click “Start”, it will search all new BIOS/drivers/utilities from Internet. Then follow the wizard to finish the update operation.



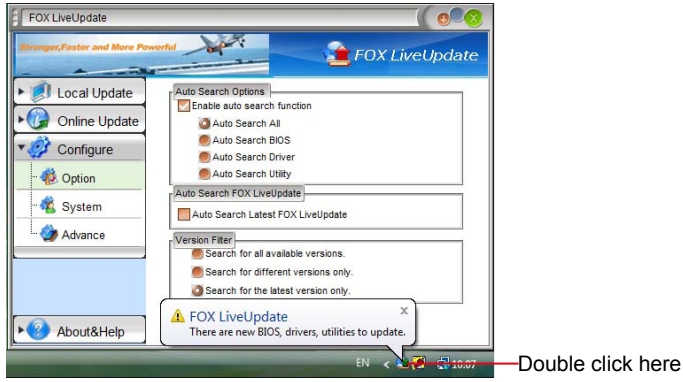
3. Configure

3-1 Configure - option

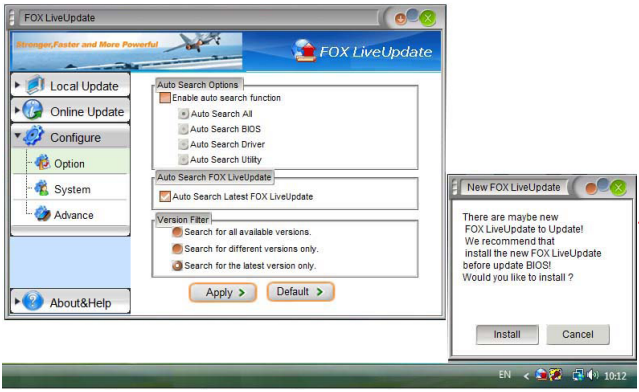
This page lets you set auto search options. After you enable the auto search function, FOX LiveUpdate will start its searching from Internet and if any qualified item found, it will pop out a message on the task bar to inform you to do the next step.



Double click on the icon as show below, you can see the detailed information.

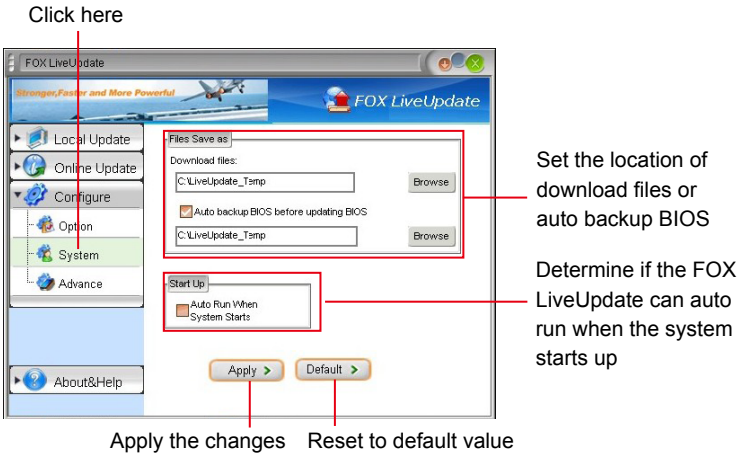


When you enable "Auto Search FOX LiveUpdate", if your FOX LiveUpdate version is older, it will auto search from internet and prompt you to install the new version.



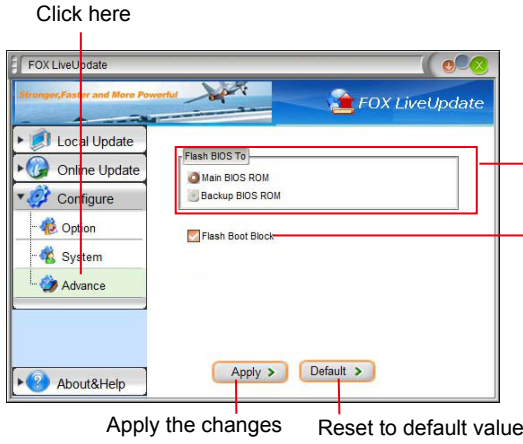
3-2 Configure - System

This page lets you set the backup BIOS location and determine if the FOX LiveUpdate can auto run when the system starts up.



3-3 Configure - Advance

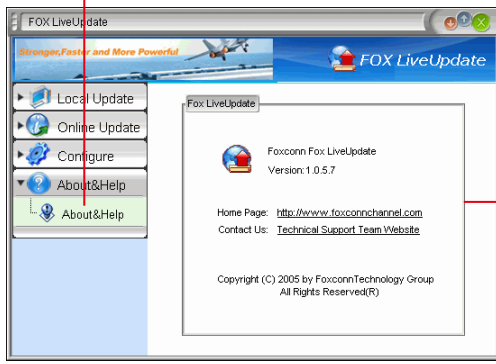
This page lets you select to flash BIOS / Boot Block. If you choose Flash Boot Block, it means BIOS is not protective, and you must make sure the flash process is continuous and without any interruption.



NOTE We recommend that you had better keep the default setting unchanged to avoid any damage.

4. About & Help

This page shows some information about FOX LiveUpdate.



4-4 FOX LOGO

FOX LOGO is a simple and useful utility to backup, change and delete the boot time Logo. The boot Logo is the image that appears on screen during POST (Power-On Self-Test).

You can prepare a JPG image (1024x768) file, then use FOX LOGO to open it and change the boot time Logo. Boot time Logo will be displayed if you enable the BIOS "Quiet Boot" setting in "Advanced BIOS Features" menu.

Supporting Operating Systems :

- Windows 7 (32-bit and 64-bit)
- Windows 8.1 (32-bit and 64-bit)

CAUTION

When you change Logo or delete current Logo, the system will flash BIOS file automatically. During this time, please DO NOT shut down the application and the system, or the motherboard will be damaged seriously.

4-5 FOX DMI

FOX DMI is a full Desktop Management Interface viewer, and it provides three DMI data formats: Report, Data Fields and Memory Dump.
With DMI information, system maker can easily analyze and troubleshoot your motherboard if there is any problem occurred.

Supporting Operating Systems :

- Windows 7 (32-bit and 64-bit)
- Windows 8.1 (32-bit and 64-bit)

Please operate this utility as the comments shows.

Click here to select the type you want to view

Click here to select the DMI Data format you need